R
Rockville Get Into It

Case: 20 -

# City of Rockville Inspection Services Division FIRE PROTECTION SITE PLAN

### **Fire Protection Site Plan**

The Fire Protection site plan shall be an accurate, to-scale, representation of all structures on the project site, including pools, retaining walls and fences. This site plan shall be separate from other submitted plans and shall include:

- Project name, address, property lines, and grade lines.
- Name(s) for all roadways on/or immediately adjacent to the project area.
- Drawn to scale with compass (North Arrow) graphic representation.
- Legend identifying all symbols.
- □ Fire Department Access Box Location.

### **Building Code Summary requirements**

- □ **Use Group** Use Group per International Building Code (IBC)
- □ **Construction Type** Type of construction per the International Building Code (IBC)
- □ Fire Protection Systems Provide Fire Protection Systems to be installed
- □ **Height Calculations** Provide calculations for allowable height per IBC and the designed height of the proposed building(s) shall be shown on the Fire Protection Site Plan.
- □ **Area Calculations** Provide allowable area calculations per IBC and the designed area of the proposed building(s) shall be shown on the Fire Protection Site Plan.
- □ Frontage Perimeter If frontage is used for an area increase, all portions of the building(s) exterior, including width, used in the frontage increase calculation must be indicated on the fire protection site plan. Overhead obstructions to fire department operations (e.g., power lines and trees) should be minimized within the 20' open area used for frontage calculations.

## Fire Department Access summary requirements

- Fire Department Access Roads Fire department access roads shall consist of roadways (where speeds do not exceed 35 mph), fire lanes, parking lot lanes, or a combination thereof.
- □ **20' width** Fire department access roads shall have an unobstructed width of not less than 20 ft (6.1 m).
- 16'0" height For portions of the fire department access road that have overhead obstructions, provide callouts with the height of the obstruction measured from the driving surface.
- A fire department access road shall extend to within 50 ft (15 m) of at least one exterior door that can be opened from the outside and provides access to the interior of the building.
- □ **Perimeter Access** Any portion of the building(s) or any portion of the exterior wall of the first story of the building(s) shall be no further from a fire department access road(s) than

the distances indicated below. The distances shall be measured from the fire department access road, along a path that reasonably could be expected to be walked by fire department personnel.

- Non-sprinkler Building Shall not exceed 150 feet. Fire department access roads shall be provided such that any portion of the facility or any portion of an exterior wall of the first story of the building is located not more than 150 ft (46 m) from fire department access roads as measured by an approved route around the exterior of the building or facility.
- □ **Sprinkler Building** Shall not exceed 450 feet. When buildings are protected throughout with an approved automatic sprinkler system that is installed in accordance with NFPA 13, NFPA 13D, or NFPA 13R, the distance in NFPA 1, 18.2.3.2.2 shall be permitted to be increased to 450 ft (137 m).
- Surface Fire department access roads shall be designed and maintained to support the imposed loads of fire apparatus and shall be provided with an all-weather driving surface. Materials and systems other than asphalt or concrete will require additional information subject to approval by Permit and Inspection Services.
- □ **Curb Cuts** Fire Department Access Roads connecting to roadways shall be provided with curb cuts extending at least 2' beyond each edge of the fire department access road.
- Multiple Access Roads More than one fire department access road shall be provided if access by a single access road could be impaired by vehicle congestion, condition of terrain, climatic conditions or other factors. Permit and Inspection Services shall make the final determination for the necessity of additional Fire department Access Roads.
- □ **Turnarounds** All Fire Department Access Roads in excess of 150' must be provided with an approved means for fire department apparatus to turn around.
- Obstructions to Fire Department Access Fire Protection Site Plan shall indicate gates, bollards or other obstructions to Fire Department Access in the roads. If these obstructions are designed to permit Fire Department Access, information regarding the method of access shall be provided.
- Marking Provide any proposed signage pertaining to the Fire Department Access.
- □ **Fire Hydrants** Show the location of all fire hydrants on the project site.
- □ The location of the Fire Department Connection (FDC or Siamese connection) should be shown if location of the FDC is known or anticipated. A fire hydrant is required to be within 100' of the FDC.
- □ **Fire Flow Data** Provide calculations showing the required fire flows, per NFPA 1, Section 18.4. and documentation providing the anticipated fire flow provided on-site.

# Means of Egress Summary Requirements

- □ **Exit Termination** Show all exit points on the building(s), providing emergency egress for building occupants.
- □ **Exit Discharge** Beginning at the exterior of the building(s), provide the following information for the exit discharge
- □ **Width** The width of the walking surface shall be indicated and shall not reduce to less than is required based upon the occupant load.
- □ **Surface** Walking surface materials must be stable, level, slip resistant and free of tripping hazards.
- □ **Path to a Public Way** —Provide the path of exit discharge from the exterior of the building(s) to a public way.
- Special Provisions Provide special egressing arrangements (e.g., discharging into a secured, outside enclosure, or courtyard) for consideration by the Inspection Services Division.

Reference Codes: International Building Code, NFPA 1, *Fire Code*, and NFPA 101, *Life Safety Code*, should be used in developing the Fire Protection Site Plan.